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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
08/477,704	06/07/1995	MITJA V. HINDERKS	RCH-22164-F- 6330	
7:	590 07/02/2003			
MITJI HINDI	<del>-</del>	EXAMINER		
LOS ANGELE	X AVENUE NO 1228 S, CA 90024	KAMEN, NOAH P		
			ART UNIT	PAPER NUMBER
			3747	1-1
	,		DATE MAILED: 07/02/2003	5 3

Please find below and/or attached an Office communication concerning this application or proceeding.

1			Application	n No.	Applicant(s)			
Offic Action Summany		08/477,70	4	HINDERKS, MITJA V.				
	Oilic	Action Summary	Examiner		Art Unit			
			Noah Kan		3747			
Period f		ING DATE f this communication	n appears on the	c ver sheet with the c	orrespondence ad	dress		
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).  - Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).  Status								
1)⊠	Responsive to communication(s) filed on <u>28 May 2003</u> .							
2a)□	•		This action is	non-final.				
3)□	<i>'</i>							
Disposition of Claims								
4)⊠	Claim(s)	390-550 is/are pending in the ap	oplication.					
	4a) Of the above claim(s) is/are withdrawn from consideration.							
5)	Claim(s) is/are allowed.							
6)⊠	☑ Claim(s) <u>390-550</u> is/are rejected.							
7)	Claim(s)_	is/are objected to.			٠			
8) Claim(s) are subject to restriction and/or election requirement.  Application Papers								
9)☐ The specification is objected to by the Examiner.								
10)	The drawir	ig(s) filed on is/are: a)□	accepted or b)	objected to by the Exar	miner.			
	Applicant	may not request that any objection	to the drawing(s)	be held in abeyance. Se	ee 37 CFR 1.85(a).			
11)	The propos	sed drawing correction filed on _	is: a)∐ ap	oproved b)⊡ disappro	ved by the Examin	er.		
If approved, corrected drawings are required in reply to this Office action.								
12) The oath or declaration is objected to by the Examiner.								
Priority under 35 U.S.C. §§ 119 and 120								
13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).								
a) All b) Some * c) None of:								
	1. Certified copies of the priority documents have been received.							
	2. Certified copies of the priority documents have been received in Application No							
<ul> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>								
14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).								
a) The translation of the foreign language provisional application has been received.  15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.								
Attachment(s)								
1)  Notice 2)  Notice	ce of Reference ce of Draftspe	ces Cited (PTO-892) rson's Patent Drawing Review (PTO-94 sure Statement(s) (PTO-1449) Paper N		_	r (PTO-413) Paper No Patent Application (PT			

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#### **DETAILED ACTION**

#### Specification

Applicant must include a statement that the substitute specification last filed contains no new matter. The examiner simply does not have the time to review the amended disclosure to ensure no new matter. It would be helpful, though, if the applicant could provide the examiner with a copy of the original spec. and the present spec. on either CD or floppy disk-that way the examiner will be better able to check for errors and make corrections via the "find" button in the word processor.

### Claim Rejections - 35 USC § 112

Claims 395, 429, 430, 523, are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In regard to claim 395, "special means" is vague. What is so special?

In regard to claims 429, 430, 507, 508, 549, 550, there is no antecedent basis for "said segment".

Claim 494 is redundant with respect to claim 486.

Claims 523, 546, 547, are redundant with respect to claim 509.

Claims 391, 393, 417-420, 427, 431-470, 472, 474, 490-493, 498-501, 504, 505, 507, 510, 512, 536-539, are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention. In regard to claims 391, 393, 431, 472, 474, the combination of a rotating cylinder and a rotating-reciprocating piston working device is not adequately set forth in a unified combination. In like manner, the features

of claims 417-420, 498-501, 536-539 are not set forth in combination with the reciprocating-rotating piston device. Where is a wave like component/cylinder under tension set forth as required by claims 490-493. Where is the combination set forth of a wave like component including a projecting portion?

Applicant is encouraged to provide a copy of the claims indicating where in new specification and what figure each claim is described and shown.

## Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 390 and 408, 411, 412, 421, 422, 425, are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Dreisbach (1,629,686). In regard to claim 408, the depression reads on the piston ring grooves. In regard to claim 411, the screws 46 read on the elements.

Claims 390, 397, 428, are rejected under 35 U.S.C. 102(b) as being clearly anticipated by MacKirdy (1,801,633).

Claims 471, 477, 502, 506, are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Boyd.

# Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

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invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 392, 423, 424, 426, are rejected under 35 U.S.C. 103(a) as being unpatentable over Dreisbach.

While Dreisbach fails to explicitly show a fuel delivery system and exhaust emission control system, such features are so well known that it would have been obvious to one of ordinary skill in the art to include them.

Claims 394 and 395 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dreisbach as applied to claim 392 above, and further in view of Waeber (2,310,269). It would have been obvious to one of ordinary skill in the art to combine two engines of Dreisbach together if more power was desired in view of the teachings of Waeber. The special means is so broad as to read on a common exhaust system with a turbocharger.

Claims 509, 511, 530, 531, 540, 541, 542, 543, 544, 545 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dreisbach as applied to claims 392, 423, 424, 426 above, and further in view of Nallinger. It would have been obvious to one of ordinary skill in the art to include noise-insulating material around the engine of Dreisbach so as to be more user friendly as taught by Nallinger.

Claims 390, 392, 396, 398, 399, 409, 410, are rejected under 35 U.S.C. 103(a) as being unpatentable over Brown in view of Dreisbach. It would have been obvious to one of ordinary skill in the art to modify the crank to shaft of Brown with the cam to shaft of Dreisbach so as to have a "simple and reliable engine" (page 1, lines 49). In regard to claims 409, 410, the bolts/stud proximate 13, 19 are deemed under tension.

Claims 400-403 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brown in view of Dreisbach as applied to claims 398, 399 above, and further in view of Berger (3,503,716). It would have been obvious to one of ordinary skill in the art to include catalytic

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filamentary material in any of the exhaust passages of Brown in view of Berger to reduce pollution.

Claims 404, 405, 509, 511, 528, 529, 548, are rejected under 35 U.S.C. 103(a) as being unpatentable over Brown in view of Dreisbach as applied to claims 390, 392 above, and further in view of Nallinger (3,112,810). It would have been obvious to one of ordinary skill in the art to include noise-insulating material around the engine of Brown so as to be more user friendly as taught by Nallinger. In regard to claims 528, 529, bolt/stud near 13, 19 are deemed under tension.

Claims 406, 407, 413-416 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dreisbach as applied to claims 390, 392 above, and further in view of Goldsborough (1,812,870). It would have been obvious to one of ordinary skill in the art to make the piston and cylinder of Dreisbach out of ceramic for higher operating efficiencies in view of Goldsborough. In regard to claims 413-416, the spark plugs read on the electric circuit.

Claims 532-535 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dreisbach in view of Nallinger as applied to claims 511 above, and further in view of Goldsborough. It would have been obvious to one of ordinary skill in the art to make the piston and cylinder of Dreisbach out of ceramic for higher operating efficiencies in view of Goldsborough. In regard to claims 534, 535, the spark plugs read on the electric circuit.

Claims 471, 473, 478, 479, 480, 503, are rejected under 35 U.S.C. 103(a) as being unpatentable over Boyd (3,667,876).

While Boyd fails to explicitly show a fuel delivery system and exhaust emission control system, such features are so well known that it would have been obvious to one of ordinary skill in the art to include them. In regard to claim 478, the volume set forth is so broad as to read common

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exhaust manifold. In regard to claim 489, the depression reads on microscopic deformations on the component.

Claims 475 and 476 are rejected under 35 U.S.C. 103(a) as being unpatentable over Boyd as applied to claim 473 above, and further in view of Waeber (2,310,269). It would have been obvious to one of ordinary skill in the art to combine two engines of Boyd together if more power was desired in view of the teachings of Waeber. The special means is so broad as to read on a common exhaust system with a turbocharger.

Claims 481-484 are rejected under 35 U.S.C. 103(a) as being unpatentable over Boyd as applied to claims 480 above, and further in view of Berger (3,503,716). It would have been obvious to one of ordinary skill in the art to include catalytic filamentary material in any of the exhaust passages of Boyd in view of Berger to reduce pollution.

Claims 485, 509, 511, 515-518 are rejected under 35 U.S.C. 103(a) as being unpatentable over Boyd as applied to claims 471 above, and further in view of Nallinger (3,112,810). It would have been obvious to one of ordinary skill in the art to include noise insulating material around the engine of Boyd so as to be more user friendly as taught by Nallinger. The volume reads on a common exhaust manifold.

Claims 486-488, 494-497 are rejected under 35 U.S.C. 103(a) as being unpatentable over Boyd as applied to claims 473 above, and further in view of Goldsborough (1,812,870). It would have been obvious to one of ordinary skill in the art to make the piston and cylinder of Boyd out of ceramic for higher operating efficiencies in view of Goldsborough. In regard to claims 496, 497, the spark plugs read on the electric circuit.

Claims 509, 511, 515-518, are rejected under 35 U.S.C. 103(a) as being unpatentable over Brown in view of Dreisbach and Nallinger. It would have been obvious to one of ordinary skill in the art to modify the crank to shaft of Brown with the cam to shaft of Dreisbach so as to

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have a "simple and reliable engine" (page 1, lines 49). It would have been obvious to one of ordinary skill in the art to include noise-insulating material around the engine of Brown so as to be more user friendly as taught by Nallinger. In regard to claims 516-518, the volume reads on a common exhaust manifold. In regard to claim 527, the depression reads on a microscopic depression on the component.

Claims 513, 514, are rejected under 35 U.S.C. 103(a) as being unpatentable over Brown in view of Dreisbach and Nallinger as applied to claim 511 and further in view of Waeber (2,310,269). It would have been obvious to one of ordinary skill in the art to combine two engines of Brown together if more power was desired in view of the teachings of Waeber. The special means is so broad as to read on a common exhaust system with a turbocharger.

Claims 519-522 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brown in view of Dreisbach and Nallinger as applied to claim 517 above, and further in view of Berger (3,503,716). It would have been obvious to one of ordinary skill in the art to include catalytic filamentary material in any of the exhaust passages of Brown in view of Berger to reduce pollution.

Claims 524-526 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brown in view of Dreisbach and Nallinger as applied to claims 509, 511 above, and further in view of Goldsborough (1,812,870). It would have been obvious to one of ordinary skill in the art to make the piston and cylinder of Dreisbach out of ceramic for higher operating efficiencies in view of Goldsborough. In regard to claims 413-416, the spark plugs read on the electric circuit.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Noah Kamen whose telephone number is 703 308 1945. The examiner can normally be reached on M-Th.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Henry Yuen can be reached on 703-308-1946. The fax phone numbers for the organization where this application or proceeding is assigned are 703 872 9302 for regular communications and 703 872 9303 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 308 0861.

Noah Kamen

Primary Examiner Art Unit 3747

nk

June 30, 2003